

IN THE CLAIMS:

Claims 1-4 (Cancelled)

Claim 5. (Previously Amended): A method of obtaining a target polypeptide having a bindable epitope from a product, the method comprising:

contacting a product which comprises a target polypeptide having a bindable epitope with a transgenically produced multivalent binding polypeptide, wherein the transgenically produced multivalent binding polypeptide comprises a first binding moiety which specifically binds the bindable epitope of the target polypeptide and a second binding moiety which specifically binds a matrix, to thereby provide a reaction mixture;

contacting the reaction mixture with a matrix which specifically binds the second binding moiety of the multivalent binding polypeptide;

removing reaction mixture which does not bind to the matrix, to thereby obtain the target polypeptide from the product; and

wherein the reaction mixture is substantially fluid.

Claim 6. (Original): The method according to claim 5, further comprising eluting the target polypeptide from the matrix.

Claim 7. (Cancelled)

Claim 8. (Original): The method according to claim 5, wherein the target polypeptide is an antibody.

Claim 9. (Previously Amended): The method according to claim 8, wherein the first binding moiety of the transgenic multivalent binding polypeptide is protein L or a chemically functional fragment thereof.

Claim 10. (Previously Amended): The method according to claim 9, wherein the second binding moiety of the transgenic multivalent binding polypeptide is a cellulose bind domain (CBD) or a chemically functional fragment thereof.

Claim 11. (Cancelled)

Claim 12. (Previously Amended): A method of obtaining a target polypeptide having a bindable epitope from the milk of a first non-human transgenic mammal, the method comprising:
contacting milk which comprises a target polypeptide having a bindable epitope with a transgenically produced multivalent binding polypeptide, wherein the multivalent binding polypeptide comprises a first binding moiety which specifically binds the bindable epitope of the target polypeptide and a second binding moiety which specifically binds a matrix, to thereby provide a reaction mixture;
contacting the reaction mixture with a matrix which specifically binds the second binding moiety of the multivalent binding polypeptide;
removing reaction mixture which does not bind to the matrix, to thereby obtain the target polypeptide from the milk;
wherein the reaction mixture is substantially fluid; and,
wherein the transgenically produced multivalent binding polypeptide is produced in milk from a second non-human transgenic mammal.

Claim 13. (Original): The method according to claim 12, further comprising eluting the target polypeptide from the matrix.

Claim 14. (Original): The method of claim 12, wherein the target polypeptide is a transgenically produced polypeptide.

Claims 15-18. (Cancelled)

Please Cancel Claims 19 - 20

~~Claim 19. The system according to claim 2, wherein the transgenically produced multivalent polypeptide further comprises a third binding moiety and the third binding moiety is capable of removing the bindable epitope from the target polypeptide.~~

~~Claim 20. The method according to claim 5, wherein the transgenically produced multivalent polypeptide further comprises a third binding moiety and the third binding moiety is capable of removing the bindable epitope from the target polypeptide.~~

Claim 21. (Previously Presented): The method of claim 5, wherein the first binding moiety of the multivalent binding polypeptide is an antibody or functional fragment thereof which binds the bindable epitope of the target polypeptide.

Claim 22. (Previously Amended): The method of claim 5, wherein the second binding moiety of the multivalent binding polypeptide is a cellulose binding domain (CBD), or a chemically functional fragment thereof.

Claim 23. (Previously Presented): The method of claim 5, wherein the target polypeptide is a receptor and the first binding moiety of the multivalent binding polypeptide is a ligand which binds the bindable epitope of the receptor.

Claim 24. (Previously Presented): The method of claim 5, wherein the first binding moiety of the multivalent binding polypeptide is a receptor which binds the bindable epitope of the target polypeptide.

Claim 25. (Previously Amended): The method according to claim 12, wherein the transgenically produced multivalent binding polypeptide is produced in the milk of a second non-human transgenic mammal.

Please Cancel Claim 26

~~Claim 26. The method of claim 12, wherein the transgenically produced multivalent polypeptide further comprises a third binding moiety and the third binding moiety is capable of removing the bindable epitope from the target polypeptide.~~

Claim 27. (Previously Amended): The method of claim 12, wherein the first binding moiety of the multivalent binding polypeptide is an antibody or chemically functional fragment thereof which binds the bindable epitope of the target polypeptide.

Claim 28. (Previously Amended): The method of claim 12, wherein the second binding moiety of the multivalent binding polypeptide is a cellulose binding domain (CBD), or a chemically functional fragment thereof.

Claim 29. (Previously Presented): The method of claim 12, wherein the target polypeptide is a receptor and the first binding moiety of the multivalent binding polypeptide is a ligand which binds the bindable epitope of the receptor.

Claim 30. (Previously Presented): The method of claim 12, wherein the first binding moiety of the multivalent binding polypeptide is a receptor which binds the bindable epitope of the target polypeptide.

Please Cancel Claims 31-36

~~Claim 31. The method of claim 5, wherein said multivalent polypeptide is used in an ELISA format.~~

~~Claim 32. The method of claim 6, wherein said target polypeptide is purified from the reaction mixture to a composition that is more than 90% pure.~~

~~Claim 33. The method of claim 5, wherein said reaction mixture is semi-solid~~

~~Claim 34. The method of claim 12, wherein said multivalent polypeptide is used in an ELISA format.~~

~~Claim 35. The method of claim 12, wherein said target polypeptide is purified from the reaction mixture to a composition that is more than 90% pure.~~

~~Claim 36. The method of claim 12, wherein said reaction mixture is semi-solid.~~